

What is claimed is:

1. A method of treating a disease or disorder characterized by an abnormal bone or mineral homeostasis which comprises administering to a subject in need of treatment thereof an effective amount of a calcilytic compound in conjunction with an effective amount of an anti-resorptive agent.
2. A method according to claim 1 wherein the calcilytic compound is selected from the group consisting of:
 - N-[(2R-Hydroxy-3-[(3-chloro-2-cyano)phenoxy-propyl]-1,1-dimethyl-2-(2-naphthyl)ethyl amine hydrochloride;
 - N-[(2R-Hydroxy-3-[(3-chloro-2-cyano)phenoxy-propyl]-1,1-dimethyl-2-(4-methoxyphenyl)ethyl amine hydrochloride;
 - N-[(2R-Hydroxy-3-[(2,3-dichloro)phenoxy-propyl]-1,1-dimethyl-2-(4-methoxyphenyl)ethyl amine hydrochloride;
 - N-[(R)-2-Hydroxy-3-[2-cyano-4-[N-methyl-N-[3-carboxyphenyl)sulfonyl]amino]-phenoxy]propyl]-1,1-dimethyl-2-(6-(1,2,3,4-tetrahydronaphthyl)ethylamine;
 - N-[(R)-2-Hydroxy-3-[2-cyano-4-[N-methyl-N-[3-carboxyphenyl)sulfonyl]amino]-phenoxy]propyl]-1,1-dimethyl-2-(Benzothien-3-yl)-ethylamine;
 - N-[(R)-2-Hydroxy-3-[2-cyano-4-[N-methyl-N-[3-carboxyphenyl)sulfonyl]amino]-phenoxy]propyl]-1,1-dimethyl-2-(Benzothien-2-yl)-ethylamine;
 - N-[(R)-2-Hydroxy-3-[2-cyano-4-[N-methyl-N-[3-carboxyphenyl)sulfonyl]amino]-phenoxy]propyl]-1,1-dimethyl-2-(decahydronaphthalen-2-yl)ethylamine;
 - N-[(R)-2-Hydroxy-3-[2-cyano-4-[N-methyl-N-[3-carboxyphenyl)sulfonyl]amino]-phenoxy]propyl]-1,1-dimethyl-4-phenylbutylamine;
 - N-[(R)-2-Hydroxy-3-[2-cyano-4-[N-methyl-N-[3-carboxyphenyl)sulfonyl]amino]-phenoxy]propyl]-1,1-dimethyl-4-(2-methoxyphenyl)butylamine;
 - N-[2R-Hydroxy-3-[[2-cyano-4-[N-methyl-N-[4-ethylcarboxyphenyl)sulfonyl]-amino]phenoxy]propyl]-1,1-dimethyl-2-(2-naphthyl)ethylamine;
 - N-[2R-Hydroxy-3-[[2-cyano-4-[N-methyl-N-[3-methylcarboxymethoxyphenyl)sulfonyl]-amino]phenoxy]propyl]-1,1-dimethyl-2-(2-naphthyl)ethylamine;

- N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-2-[2-naphthyl]ethylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-2-(1,2,3,4-tetrahydronaphth-6-yl)ethylamine.
- 5 N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-2-(benzothien-3-yl)-ethylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-2-(benzothien-2-yl)-ethylamine;
- 10 N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-2-(decahydronaphthalen-2-yl)-ethylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-4-(2-
- 15 methoxyphenyl)butylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methylsulfonyl]-N-[[[1-[2-[6-methyl]amino]-pyridyl]ethyl]amino]phenoxy]propyl]-1,1-dimethyl-4-phenylbutylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-[N-benzyl-N-[4-methylphenyl]sulfonyl]amino]phenoxy]propyl]-1,1-dimethyl-2-[4-methoxyphenyl]ethylamine;
- 20 N-[2R-Hydroxy-3-[[2-cyano-4-[N-[4-benzyl]sulfonyl]amino]phenoxy]propyl]-1,1-dimethyl-2-[2-naphthyl]ethylamine;
- N-[2R-Hydroxy-3-[[2-cyano-5-[4-carboxy]phenyl]phenoxy]propyl]-1,1-dimethyl-2-[naphthyl]ethylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-[[N-methyl-N-[3-carboxyl]phenyl]sulfonyl]amino]phenoxy]propyl]-1,1-dimethyl-2-[2-naphthyl]ethylamine; N-[2R-Hydroxy-3-[[2-
- 25 cyano-4-[[N-methyl-N-[3-methylcarboxyl]phenyl]sulfonyl]amino]phenoxy]propyl]-1,1-dimethyl-2-[2-naphthyl]ethylamine;
- N-[2R-Hydroxy-3-[[2-cyano-4-(2-phenyl-2-R,S-carboxyl)phenoxy]-propyl]-1,1-
- 30 dimethyl-2-(2-naphthyl)ethylamine;

N-[2R-Hydroxy-3-[[2-cyano-4-(3-carboxypropyl)phenoxy]-propyl]-1,1-dimethyl-2-naphthylethylamine;

(N-[2R-Hydroxy-3-[[2-cyano-5-(3-carboxypropyl)phenoxy]-propyl]-1,1-dimethyl-2-naphthylethylamine; and

- 5 (N-[2R-Hydroxy-3-[2-[2-[6-aminomethyl]pyridyl]ethyloxy]-1,1-dimethyl-2-naphthylethylamine.

3. A method according to claim 2 wherein the anti-resorptive agent is selected from the group consisting of: estrogen, 1, 25 (OH)₂ vitamin D₃, calcitonin, selective estrogen receptor modulators, vitronectin receptor antagonists, V-H⁺-ATPase
10 inhibitors, src SH2 antagonists, bisphosphonates and cathepsin K inhibitors.

4. A method according to claim 1 wherein the bone or mineral disease or disorder is selected from the group consisting of: periodontal disease, fracture healing, osteoarthritis, rheumatoid arthritis, Paget's disease, humoral hypercalcemia of malignancy, metastatic bone disease, joint replacement and osteoporosis.

- 15 5. A method according to claim 3 wherein the bone or mineral disease or disorder is osteoporosis.

6. A method according to claim 1 wherein the calcilytic agent causes an increase in serum PTH levels of 3-fold or higher.

7. A method according to claim 1 wherein the calcilytic agent causes an
20 increase in serum PTH levels of 2-fold or higher.

8. A method of treating a disease or disorder characterized by an abnormal bone or mineral homeostasis which comprises administering to a subject in need of treatment thereof an effective amount of an anabolic compound in conjunction with an effective amount of an anti-resorptive agent.

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